

[CHIP STRUCTURE WITH A PASSIVE DEVICE AND METHOD FOR FORMING THE SAME]

Abstract

The present invention provides a method for forming a chip structure with a resistor. A semiconductor substrate is provided and has a surface. A plurality of electronic devices and a resistor is formed on the surface of the semiconductor substrate. A plurality of dielectric layers and a plurality of circuit layers are formed over the semiconductor substrate. The dielectric layers are stacked over the semiconductor substrate and have a plurality of via holes. Each of the circuit layers is disposed on corresponding one of the dielectric layers respectively, wherein the circuit layers are electrically connected with each other through the via holes and are electrically connected to the electronic devices. A passivation layer is formed over the dielectric layers and the circuit layers. A circuit line is formed over the passivation layer, wherein the circuit line passes through the passivation layer and is electrically connected to the resistor.